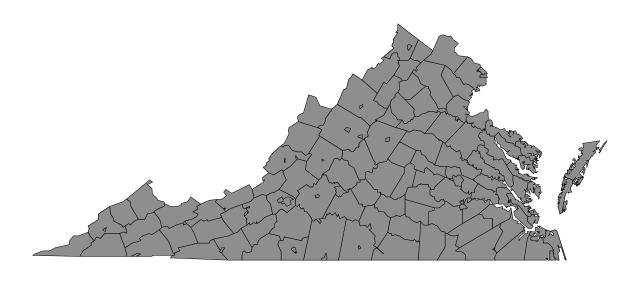
# PARENT PERCEPTIONS OF SERVICES AT COMMUNITY SERVICES BOARDS

# Outpatient Mental Health Services Provided to Children and Adolescents FY2004



March, 2005

OFFICE OF MENTAL HEALTH SERVICES
VIRGINIA DEPARTMENT OF MENTAL HEALTH, MENTAL RETARDATION AND
SUBSTANCE ABUSE SERVICES
P.O. Box 1797
Richmond, VA 23218-1797

#### **AUTHORS**

Molly Brunk, Ph.D.

Research Consultant 530 E. Main, Suite 701 Richmond, VA 23219 804-648-0123 mbrunk@hsc.vcu.edu

# Will Ferriss, LCSW

Planning and Evaluation Analyst
Office of Mental Health
Virginia DMHMRSAS
P.O. Box 1797 23218
(804) 371-0363
will.ferriss@co.dmhmrsas.virginia.gov

Contact Will Ferriss if you need further Information or if you have questions.

# **TABLE OF CONTENTS**

EXECUTIVE SUMMARY	1
BACKGROUND	1
DEMOGRAPHIC FINDINGS	1
Performance Indicator Findings.	
What factors affected caregiver perceptions of services?	2
What predicts caregiver perceptions of positive outcomes?	
What predicts caregiver's satisfaction with services?	
LIMITATIONS	
INTRODUCTION	4
PURPOSE OF THE SURVEY	4
METHODOLOGY	4
Measure	4
ADMINISTRATION OF THE SURVEY	5
STATEWIDE SURVEY RESPONSES	7
DESCRIPTION OF SAMPLE	
DESCRIPTIONS OF YOUTH FUNCTIONING	
Placements in the Last Six Months	
Community Indicators of Functioning	
REPRESENTATIVENESS OF THE SURVEY RESPONDENTS TO THE POPULATION	
CAREGIVER PERCEPTIONS OF SERVICES	
COMPARISON TO PREVIOUS SURVEY ADMINISTRATIONS	
PREDICTION OF KEY OUTCOMES	
CSB Level Caregiver Perceptions of Services	
CONCLUSION	25
APPENDIX A	27
YOUTH SERVICES SURVEY FOR FAMILIES	27
APPENDIX B	30
APPENDIX C	33
APPENDIX D	34
APPENDIX E	35
APPENDIX F	37

# **TABLE OF FIGURES**

Figure 1: Overall Response Rate by CSB	6
Figure 2: Sample by Respondent Type	7
Figure 3: Sample by Gender	7
Figure 4: Sample by Race	8
Figure 5: Sample by Age Group	8
Figure 6: Sample by Insurance Type.	8
Figure 7: Sample by Length of Time in Services.	9
Figure 8: Percent of Youth Residing in Setting During Six Months Prior to Survey	10
Figure 9: Comparison of Virginia & National Survey Results by Domain	11
Figure 10: Caregiver Perceptions by Age Group	14
Figure 11: Caregiver Perceptions by Service Status	15
Figure 12: Caregiver Perceptions by Length of Time in Services	15
Figure 13: Caregiver Perceptions by Out of Home Placement	16
Figure 14: Service Type by Length of Time in Services	16
Figure 15: Percent of Youth in Services at Time of Survey by CSB	19
Figure 16: Caregiver Perception of Services by CSB - Satisfaction Domain	20
Figure 17: Caregiver Perception of Services by CSB - Access Domain	21
Figure 18: Caregiver Perceptions of Services by CSB – Caregiver Participation Domain	22
Figure 19: Caregiver Perception of Services by CSB – Cultural Sensitivity Domain	23
Figure 20: Caregiver Perceptions of Services by CSB – Outcome Domain	24

#### **EXECUTIVE SUMMARY**

# **Background**

The Virginia Department of Mental Health, Mental Retardation, and Substance Abuse Services (DMHMRSAS) has identified caregiver<sup>1</sup> perceptions of Community Services Board's (CSBs) services provided to children and adolescents as a performance measure to be assessed on an annual basis. Caregivers perceptions are monitored in five areas that have been identified as important indicators of the quality of services and are used for national reporting of the public mental health service system's performance.

The domains used to evaluate children's mental health services include:

- Access defined as the percentage of caregivers who reported good access to CSB services.
- Cultural sensitivity defined as the percentage of caregivers who perceive CSB service providers to be respectful and sensitive to their differences.
- Family participation in treatment defined as the percentage of caregivers who reported participation in their child's treatment
- Satisfaction with services defined as the percentage of caregivers who reported general satisfaction with CSB services
- Outcome defined as the percentage of caregivers who reported positive change in their child as a result of the services they received through the CSB.

Caregiver perceptions of services are assessed using the Youth Services Survey for Families (YSSF), a measure developed for the federal Mental Health Statistics Improvement Program's (MHSIP) *Consumer-Oriented Mental Health Report Card.* DMHMRSAS administered its fourth annual statewide survey to a randomly selected sample of caregivers of children and adolescents who received at least one non-emergency outpatient service during the fiscal year 2004. A mail survey methodology was used to ensure that the results were representative of all youth receiving services during the fiscal year. This report summarizes the survey findings and compares those findings to previous Virginia DMHMRSAS administrations of the survey and to national benchmarks

# **Demographic Findings**

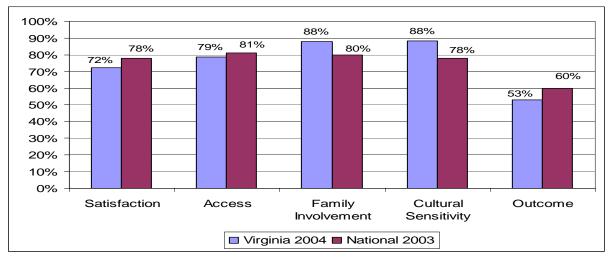
All 40 CSBs contributed survey respondents to the final sample of 1,475 caregivers. This number represents a 27% return rate and is of sufficient size to have a high degree of confidence that the results are representative of those that would be obtained if all caregivers statewide had been surveyed. The majority (86%) of the respondents identified themselves as a parent or other family member. They described their children as follows:

- The majority of youth was White (62%), male (55%), between the ages of 13 and 18 (58%), and lived exclusively with a parent or other family member in the last six months (78%).
- Most of the youth (71%) had Medicaid or FAMIS insurance.
- Over half (56%) had received services for more than one year and 64% were still in services.

<sup>&</sup>lt;sup>1</sup> While the majority of respondents were parents of the child receiving services, grandparents or others serving as the child's primary caregiver completed many surveys. The term "caregiver" will be used throughout this report to refer to any person serving as the child's primary caregiver.

#### **Performance Indicator Findings**

Overall, caregivers report positive perceptions of the services their child received. When compared to the latest national survey results available, Virginia caregivers report significantly more positive perceptions of family participation in treatment planning and cultural sensitivity than the national average. Perceptions of access are comparable, however, in the domains of satisfaction and outcomes, Virginia caregivers are significantly less positive than the national average.



Comparison of results of this survey with those of previous administrations indicates that caregiver's perceptions of services have remained stable over time in all areas except outcome. In this domain, significantly more caregivers report positive outcomes for their child (53%) than did in the survey conducted in the Fiscal Year 2000 (48%). In summary, while there has been some improvement observed in the service system's performance, this improvement has not kept pace with the majority of the other states.

#### What factors affected caregiver perceptions of services?

No significant differences were found for gender, race, or Hispanic ethnicity. Age of the youth and several service variables did have a significant relationship with domain scores.

- Caregivers of children under 13 years of age were significantly more likely to report participation in treatment planning, satisfaction and positive outcomes than were caregivers of adolescents.
- On all domains of services, caregivers of youth still receiving services were significantly more likely to report positive perceptions of services than were caregivers who were not currently receiving services for their child.
- Caregiver perceptions were significantly more positive on all domains if they had been in services for more than one year than if they had been in services a shorter period of time.

Services are perceived more positively when the youth has been in services for more than one year

• Caregivers of children who had remained in the home for the last six months were significantly more likely to report positive perceptions of services in all domains than caregivers of children who had some type of out of home placement.

#### What predicts caregiver perceptions of positive outcomes?

Understanding which factors contribute most to positive outcome can help programs target those

factors to improve caregiver perceptions of services. The results indicated that four variables were able to correctly classify 92% of caregivers who reported positive outcomes. Caregivers are likely to report positive outcomes when their children are able to remain in the home and not require ongoing medication. The model also includes caregiver satisfaction with the services and the perception that they have been able to have a voice in choosing the type of service and treatment goals for their child.

Positive outcomes predicted by:

- a) Caregiver satisfaction
- b) Caregiver participation in child's treatment
- c) Youth at home for last six months
- d) Youth not on medication

#### What predicts caregiver's satisfaction with services?

Since caregiver satisfaction with services was the primary predictor of postive perceptions of outcome, it is important to assess which factors contribute to satisfaction. This analysis also

identified caregiver participation in treatment as a significant predictor of satisfaction. Clearly, when caregivers feel that they have a choice about which services their child receives and their child's treatment goals; they are going to be more satisfied and percieve better outcomes. Other factors in the model are perceptions of good access to services and staff who are culturally sensitive. In addition, if the child is still receiving services and has been in services for one year or less, caregivers are more likely to report satisfaction with those services.

Caregiver satisfaction predicted by:

- a) Caregiver participation in child's treatment
- b) Good access to services
- c) Perceptions that staff are culturally sensitive
- c) Child still receiving services
- d) Child in services one year or less

#### Limitations

There are several limitations to consider when interpreting the results of this survey. They include:

- Cross-sectional nature of the survey. Without measures of baseline functioning for comparison, the survey measures of youth functioning can only be interpreted as a snapshot of current functioning. Therefore, these indicators should only be used to provide a picture of the system performance over time and not to evaluate the effectiveness of services.
- Sample sizes at the CSB level are too small to be representative of population served at that CSB. Therefore, CSBs should not be compared to each other on the basis of these findings.

Despite these limitations, the results of this survey provide valid and useful information about the outpatient services provided to children and adolescents through Virginia's public mental health system. Overall, caregivers perceive those services positively and there has been a gradual increase over time in the percentage of youth who are perceived as doing better as a result of the services they received. However, there is room for improvement and policies should target strategies to improve positive outcomes for youth served in the public mental health system. Based on the data available from the survey, there are some implications for what might be considered "best practices". It is likely that outcomes will be better when caregivers are involved in chosing treatment services and goals and when sufficient services are provided to meet the child's needs.

# Outpatient Mental Health Services Provided to Children and Adolescents: FY 2004

#### INTRODUCTION

#### **Purpose of the Survey**

The Virginia Department of Mental Health, Mental Retardation, and Substance Abuse Services (DMHMRSAS) has identified caregiver<sup>2</sup> perceptions of Community Services Board's (CSBs) services provided to children and adolescents as a performance measure to be assessed on an annual basis. Therefore, DMHMRSAS administered its fourth annual statewide survey to caregivers of children and adolescents who received at least one non-emergency outpatient service during the fiscal year 2004.

This report summarizes the survey findings and compares those findings to previous Virginia DMHMRSAS administrations of the survey and to national benchmarks. The review of important aspects of care over time provides the Department with information to evaluate the services it supports and helps the Department to identify areas that have the potential to improve outcomes for children with serious emotional disturbance.

It is important to note that perceptions of caregivers who could not obtain mental health services were not sampled. There continues to be a significant number of families in the Commonwealth who remain on waiting lists for services. Therefore, the results reported here cannot address the question of whether there is an adequate amount of services provided; they can only speak to the quality of services that are provided.

#### **METHODOLOGY**

#### Measure

The Youth Services Survey for Families (YSSF: Brunk, Koch, & McCall, 2000) is used to assess caregiver's perceptions of the services their child received at a community mental health center. It was developed for the Mental Health Statistics Improvement Program's (MHSIP) *Consumer-Oriented Mental Health Report Card* and is recommended for national reporting of performance indicators. The YSSF includes 22 items that are scored on a 5-point scale from "Strongly Disagree" to "Strongly Agree," and 10 items that ask how the child is doing in areas such as school attendance and juvenile justice involvement and how long the child received services from the CSB. A copy of this survey is included in Appendix A.

The survey is designed to measure five domains that have been identified as important indicators of quality of services for children and adolescents. The domains include access, cultural sensitivity, family participation in treatment, outcome, and satisfaction with services. Domain scores are calculated by taking the average of the scores on all items related to one of the scales. A score of 3.5

<sup>&</sup>lt;sup>2</sup> While the majority of respondents were parents of the child receiving services, grandparents or others serving as the child's primary caregiver completed many surveys. The term "caregiver" will be used throughout this report to refer to any person serving as the child's primary caregiver.

or more indicates agreement with the items included in the scale. For example, the domain "Percentage of consumer's parents who report participating in child's treatment" is calculated by first taking the average of a respondent's scores on the items in the Family Involvement scale (Items 2, 3 & 6). Then the percentage for the domain is determined by the number of respondents with an average scale score > 3.5 divided by the total number of respondents.

#### Administration of the Survey

In order to select a sample of caregivers to receive a survey in the mail, CSBs were asked to provide DMHMRSAS with a file that identified all children in the Child Mental Health Priority Population<sup>3</sup> that received at least one mental health service from the child and adolescent programs during the months of September through December 2003. These youth also met the federal criteria for youth with serious emotional disturbance (SED). The data file contained basic demographic information such as date of birth, race, ethnicity and gender of the youth in addition to mailing addresses. All forty CSBs provided files and, as a result, contributed to the final sample.

In April 2004, DMHMRSAS selected a random sample of youth from the submitted files to receive a survey. A total sample of 6,208 youth was selected to represent the population of an approximately 13,400 youth with SED receiving services in the fiscal year ending in 2004. The DMHMRSAS contracted with the Social Science Research Center at Old Dominion University to conduct a mail survey of the sample. Surveys were mailed to the parents identified in the sample along with a cover letter that explained the purpose of the survey, identified the CSB that had provided services, and informed recipients of the risks and benefits of returning the survey. The first wave of surveys was mailed to recipients beginning in July 2004. A second survey was mailed two weeks later to anyone who had not yet returned the survey. In order to combine the survey data with demographic information in the CSB files, a unique number was assigned to each youth in the sample and that number was included on the survey. The data for this report include all surveys received by end of August 2004.

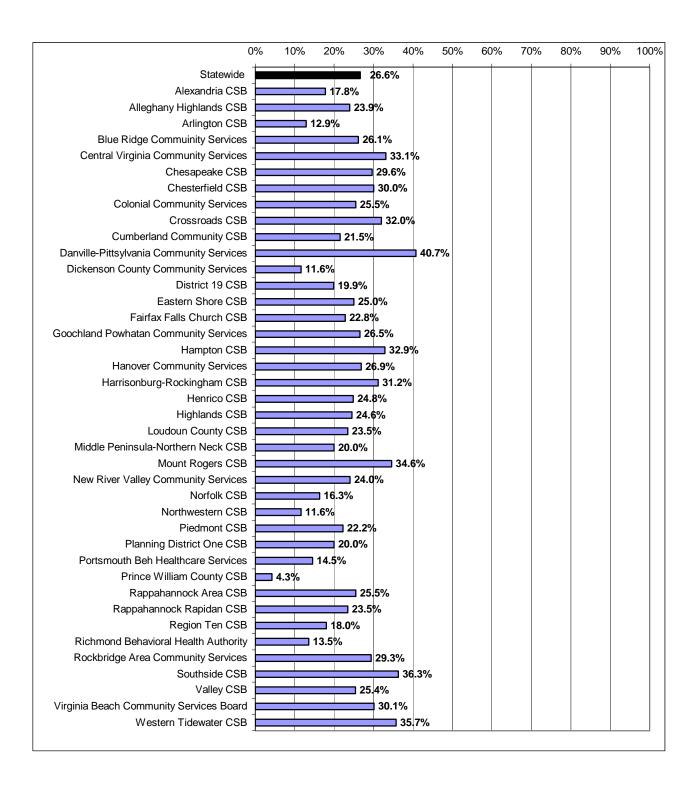
A total of 1,475 *unduplicated* valid surveys were returned and only 17 refused or returned blank surveys. A small number of the total sample, 655 (10%) had incomplete addresses. When this number of respondents was removed from the original sample, the number of respondents who actually received a survey was reduced to 5,553 and the resulting overall return rate was 26.6%. This number achieved the 95 percent confidence level and a confidence interval of +/- 5% for the statewide sample.

Figure 1 displays response rates by CSB. Seven CSBs reported response rates 5% greater than the state average, while 12 CSBs reported response rates 5% lower. Appendix C provides statistics on the number of completed surveys per CSB. For those CSBs with more than 15 completed surveys, an individual agency report will be provided to that CSB.

<sup>3</sup> A copy of the checklist used to identify youth meeting criteria for the child mental health priority population is included in Appendix B.

5

Figure 1: Overall Response Rate by CSB



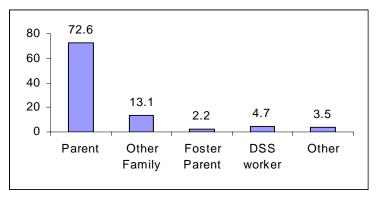
#### STATEWIDE SURVEY RESPONSES

# **Description of Sample**

#### Respondent relationship to youth receiving services

Of the 1,475 respondents to the survey, 1,418 provided information about their relationship to the identified child. The majority of the respondents identified themselves as a parent or other family member (85.7%).

Figure 2: Sample by Respondent Type

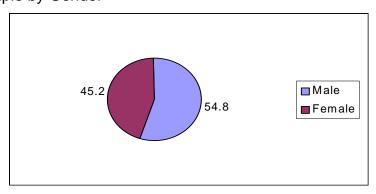


Demographic information was available on the youth who received mental health services from caregiver report and CSB data files. The youth in the sample had the following characteristics.

#### Gender

• Slightly more than half of the youth in the survey sample was male. (N=1,475)

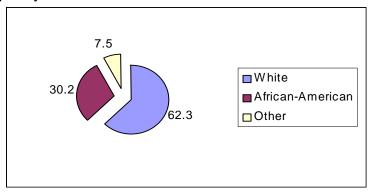
Figure 3: Sample by Gender



#### Race

• About 30% of the 1,455 caregivers responding to the question about race identified their child as African-American, while 62% were identified as White.

Figure 4: Sample by Race



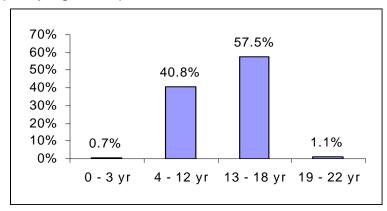
#### **Ethnicity**

• 5.6% of the 1,392 caregivers responding to the question about ethnicity identified their child as Hispanic.

#### Age

• The majority of the youth receiving services were adolescents. The average age was 13.3 years with a range from less than 1 year to 20.8 years. (N = 1,469)

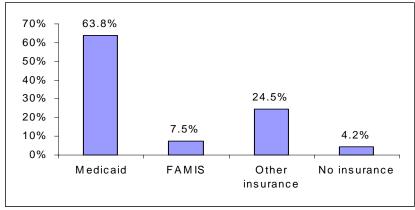
Figure 5: Sample by Age Group



#### Insurance

• The majority of the youth had Medicaid insurance or other insurance. (N = 1,373)

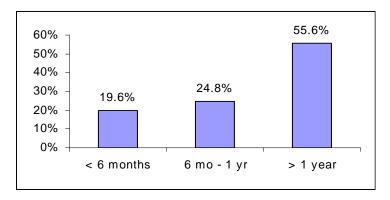
Figure 6: Sample by Insurance Type



#### Service Involvement

- The majority of youth (64.1%) were still receiving services from the CSB (N=1,439).
- The majority (55.6%) of the 1,418 caregivers responding to question about length of time in service reported the child had been in service more than one year.

Figure 7: Sample by Length of Time in Services



#### Medication

- A little more than 65% of the youth (N = 1,450) were on medication for emotional/behavioral problems.
- For those on medication (N = 1,076), 80% reported they were told about the side effects of the medicine.

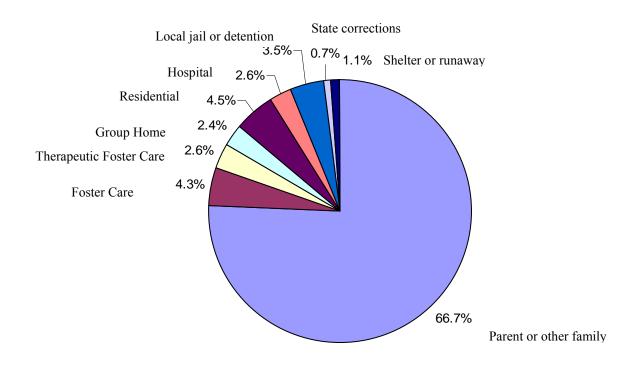
# **Descriptions of Youth Functioning**

The YSSF contains several questions to obtain the parent's report on how the child is doing in several critical areas of functioning during the month prior to the survey (e.g., "is the child in the home, in school, and out of trouble?"). Since the survey was conducted at a single point in time, these indicators cannot be interpreted as an indicator of the outcome of the services, only as a description of the population served by the service system.

#### Placements in the Last Six Months

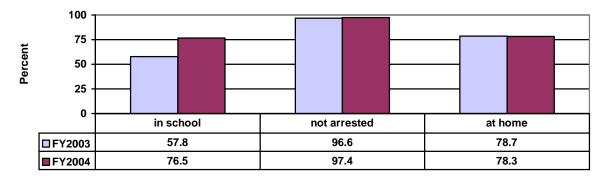
- Almost 85% of youth lived in only home-like settings during the six months (N = 1,110). Home-like settings include living with parents or other family members and foster care placements (regular and therapeutic).
- Overall, 22% of youth resided in some type of out of home placement in the last six months (N = 1,110).
- Four percent had multiple placements in six months prior to the survey (N = 1,475).
- The percent of youth in different types of settings is displayed in following figure. Numbers of youth are duplicated since youth could have been in multiple settings during the period (N = 1,475).

Figure 8: Percent of Youth Residing in Setting During Six Months Prior to Survey



# Community Indicators of Functioning

- About 78% of youth (N = 1,110) lived *only* with a parent or other family member in the last six months. This percentage is based on an unduplicated measure of placements.
- A little more than 97% of caregivers (N = 1,450) reported that the youth had not been arrested by police in the last month.
- Over 76% of youth attended school regularly in the month prior to the survey (N = 1,389)
- Eleven percent missed six days or more during the month.



**Note**. "At home" is defined as living with a parent or another family member as their only placement in the last six months. "In school" is defined as being absent no more than 2 days in the last month.

**Note.** The two surveys were administered at different times in the school year; therefore, the differences could be related to seasonal differences in attendance. Also, 30% of caregivers reported that they could not remember the number of days the youth was absent as compared to only 6% in last year's survey.

#### Representativeness of the Survey Respondents to the Population

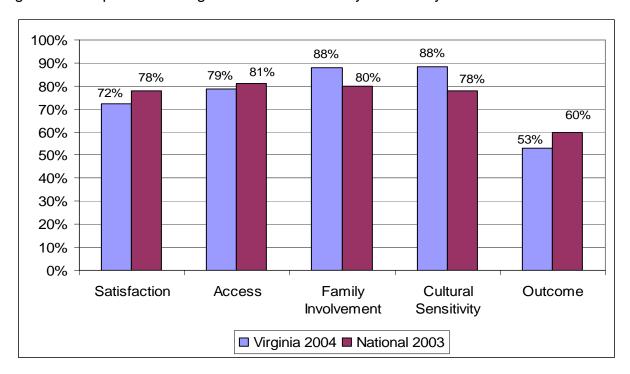
Demographic information from the Department's information system (CCS) is available on the approximately 13,400 youth with serious emotional disturbance who received mental health services in FY 2004. This information includes age, race, gender and Hispanic ethnicity of the youth. Comparison of the survey sample to the population figures indicates that the sample is representative of the overall population. Slightly more caregivers of female children age 4 to 12 years responded to the survey than occur in the overall population, however, these differences were not significant. Therefore, the results presented in this report can be generalized to the overall population with confidence.

#### **Caregiver Perceptions of Services**

Overall, caregivers report positive perceptions of the services their child received. When compared to the latest national survey results available, Virginia caregivers report significantly more positive perceptions of family participation in treatment planning and cultural sensitivity than the national average. Perceptions of access are comparable, however, in the domains of satisfaction and outcomes, Virginia caregivers are significantly less positive than the national average.

- Overall, 72.2% (+/- 2.43) of caregivers reported a positive perception with regard to the general satisfaction domain.
- About 78.8% (+/- 2.45) reported a positive perception on the access domain.
- Eighty eight percent (+/- 2.44) reported a positive perception of their participation in treatment planning for their child.
- More than 88.2% (+/- 2.47) reported a positive perception of the cultural sensitivity of staff.
- Finally, 53.1% (+/- 2.45) percent reported a positive perception on the outcome domain.

Figure 9: Comparison of Virginia & National Survey Results by Domain



It is important to note that nearly 36% of respondents were not receiving services at the time of the survey and the results are likely to include some caregivers who discontinued services due to dissatisfaction with services. Therefore, these findings should not be compared to the adult consumer survey that uses a different methodology.

#### General Satisfaction Domain

- About 81% percent agreed with the statement "Overall, I am satisfied with the services my child received".
- Seventy four percent agreed with the statement "The services my child and/or family received were right for us".
- Almost 72% agreed with the statement "My family got the help we wanted for my child".
- Only 64 % agreed with the statement "My family got as much help as we needed for my child".
- Seventy eight percent agreed that the people helping stuck with them no matter what.
- About 76% agreed that their child had someone to talk to when he or she was troubled.

#### Access Domain

- About 87% agreed that the location of services is convenient.
- Almost 84% agreed that services were available at times that were good for them.
- About 74% agreed that they were able to get an appointment as soon as they wanted.

#### Caregiver Participation in Treatment Planning Domain

- Eighty percent agreed with the statement "I helped to choose my child's services."
- Almost 79% agreed with the statement "I helped to choose my child's treatment goals."
- About 89% agreed that they participated in their child's treatment.

#### **Cultural Sensitivity Domain**

- About 86% agreed that staff was sensitive to their cultural/ethnic background.
- A little more than 92% reported staff treated them with respect.
- About 85% agreed with the statement "Staff respected my family's religious/spiritual beliefs."
- Almost 95% agreed with the statement "Staff spoke with me in a way that I understood."

#### Outcome Domain

- Almost 60% agreed with the statement "My child is better at handling daily life".
- About 60% agreed with the statement "My child gets along better with family members".
- Sixty-two percent agreed that their child gets along better with friends and other people".
- Sixty-one percent reported that their child did better at work or school as a result of services.
- Almost 51% reported that their child is better able to cope when things go wrong.
- A little over 55% agreed with the statement "I am satisfied with our family life right now".

#### **Comparison to Previous Survey Administrations**

The percentage of parents who agreed with an item is reported in Table 1 along with results of previous surveys. Agreement with an item is indicated when caregivers responded with "strongly

agree" or "agree". Item statistics including the mean and standard deviation are presented in Appendix D.

**Table 1. Summary of Responses to YSSF Survey Items** 

	%	%	%	%
ITEMS	Agree 2000	Agree 2002	Agree 2003	Agree 2004
1. Overall, I am satisfied with the services my child received.	77.3%	74.5%	81.0%	81.4%
2. I helped to choose my child's services.	76.8%	74.3%	80.9%	80.0%
3. I helped to choose my child's treatment goals.	73.4%	74.8%	79.0%	78.7%
4. The people helping my child stuck with us no matter what.	76.1%	70.9%	77.7%	78.0%
5. I felt my child had someone to talk to when he/she was troubled.	75.1%	73.9%	77.0%	76.3%
6. I participated in my child's treatment.	83.4%	85.9%	91.3%	88.7%
7. The services my child and/or family received were right for us.	68.1%	68.7%	74.0%	74.0%
8. The location of services was convenient for us.	92.0%	85.3%	87.5%	87.2%
9. Services were available at times that were convenient for us.	82.4%	80.9%	83.6%	83.6%
10. My family got the help we wanted for my child.	63.3%	66.0%	70.4%	71.9%
11. My family got as much help as we needed for my child.	53.2%	56.3%	63.2%	64.2%
12. I was able to get an appointment as soon as I wanted.	NA	67.4%	74.4%	74.1%
13. Staff treated me with respect.	91.5%	89.3%	92.9%	92.3%
14. Staff respected my family's religious/spiritual beliefs.	82.2%	82.8%	86.1%	85.3%
15. Staff spoke with me in a way that I understood.	90.8%	92.0%	94.6%	94.7%
16. Staff were sensitive to my cultural/ethnic background.	77.0%	81.9%	85.6%	85.5%
As a result of the services my child and family received:				
17. My child is better at handling daily life.	53.4%	53.6%	57.4%	59.6%
18. My child gets along better with family members.	57.9%	56.2%	61.1%	60.2%
19. My child gets along better with friends and other people.	56.9%	54.8%	59.1%	62.1%
20. My child is doing better in school and/or work.	55.0%	55.9%	59.0%	61.0%
21. My child is better able to cope when things go wrong.	41.7%	46.6%	47.9%	50.9%
22. I am satisfied with our family life right now.	46.9%	50.7%	53.4%	55.2%

Note. The survey was not conducted in 2001. The 2000 survey was an earlier version that did not include item 12.

Comparison of results of this survey with those of previous administrations indicates that caregiver's perceptions of services for children and adolescents have remained stable over time in the domains of access, participation in treatment planning, cultural sensitivity, and satisfaction. In the domain of outcomes, however, there has been a *significant* improvement in caregiver perceptions of the effectiveness of services. In this administration of the survey, 53% of caregivers perceive that their child has improved as a result of services compared to only 48% in the 2000 administration.

# **Differences Between Groups**

A number of variables were assessed to determine if perceptions of services differed by those variables. Variables available for analysis of differences included 5 youth demographics (gender, race, Hispanic ethnicity, age, in home status), 4 service variables (current service status, length of service, medication status, type of insurance), and 1 caregiver variable (respondents relationship to child). Analysis was done using SPSS 12.0. Multivariate analysis of variance was used to assess the

relationship between a variable and the average domain scores. When the multivariate analysis was significant, univariate statistics are reported. Significant differences are those differences that are statistically significant at the  $p \le .05$ ,  $p \le .01$ , or  $p \le .001$  level as indicated.

No significant differences were found for gender, race, or Hispanic ethnicity. Age of the youth and several service variables did have a significant relationship with domain scores. Those variables with a significant relationship to the domain scores are described below.

#### Did Perceptions of Services Differ by Age?

Caregivers of children under 13 years of age were significantly more likely to report participation in treatment planning, satisfaction and positive outcomes than were caregivers of adolescents.

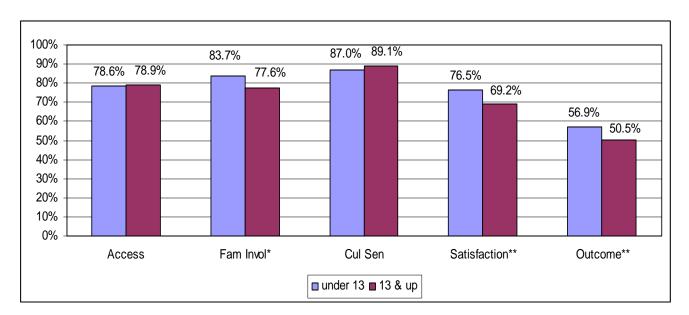


Figure 10: Caregiver Perceptions by Age Group

### Did Perceptions of Services Differ by Service Status?

On all domains of services, caregivers who were still receiving services for their child were significantly more likely to report positive perceptions of the services than were caregivers of youth who were not currently receiving services. See Figure 11 on next page.

<sup>\*</sup>Differences between groups were significant at the p≤.05 level

<sup>\*\*</sup>Differences between groups were significant at the p≤.01 level

<sup>\*\*\*</sup>Differences between groups were significant at the p≤.001 level

100.0% 85.1% 90.3% 85.8% 90.0% 82.3% 79.5% 72.5% 71.2% 80.0% 70.0% 59.2% 57.5% 60.0% 45.8% 50.0% 40.0% 30.0% 20.0% 10.0% 0.0% Access\*\*\* Fam Invol\*\*\* Cul Sen\*\*\* Satisfaction\*\*\* Outcome\*\*\* ■ In Services
■ Out of Services

Figure 11: Caregiver Perceptions by Service Status

#### Did Perceptions of Services Differ by Length of Time in Services?

On all domains of services, caregiver satisfaction varied significantly by length of time in services. Caregivers of youth, who had been in services for more than one year, reported more positive perceptions of access, family involvement, cultural sensitivity of staff, satisfaction and outcomes than caregivers of youth who received services for a shorter period of time.

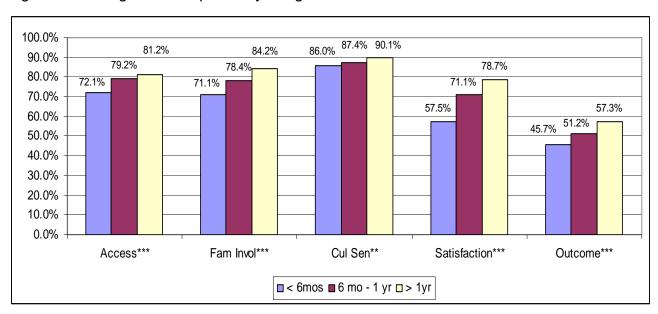


Figure 12: Caregiver Perceptions by Length of Time in Services

<sup>\*</sup> Differences between groups were significant at the p≤.05 level

<sup>\*\*</sup> Differences between groups were significant at the p≤.01 level

<sup>\*\*\*</sup>Differences between groups were significant at the p≤.001 level

# Did Perceptions of Services Differ by Child's Placement Out of Home in Last Six Months?

On all domains of services, caregivers were significantly more likely to report positive perceptions of services if their child had remained in the home for the last six months than caregivers with children who had some type of out of home placement.

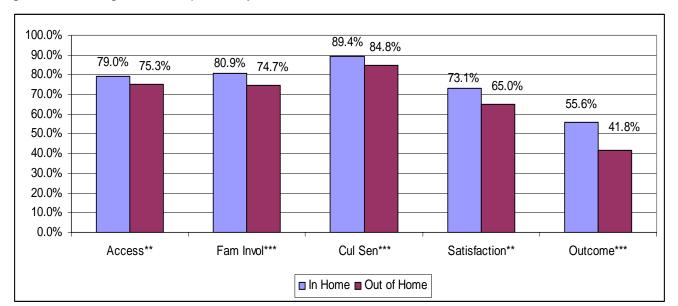


Figure 13: Caregiver Perceptions by Out of Home Placement

# How do Service Status and Length of Time in Services Relate to Each Other?

Both service variables were significantly related to the perception of care domains and were significantly correlated with each other (Pearson correlation = .43). Analysis of the data indicated that the majority 69% of the youth who were still receiving services at the time of the survey had been in services for more than one year. On the other hand, 41% of the youth who were no longer receiving services reported that they had been in services for less than 6 months.

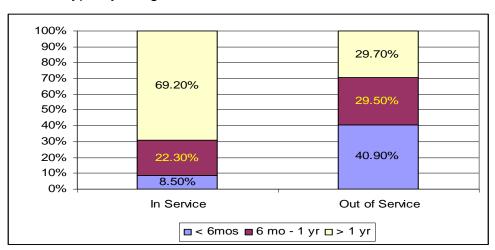


Figure 14: Service Type by Length of Time in Services

16

#### **Prediction of Key Outcomes**

Multivariate analyses were conducted to identify significant predictors of caregiver satisfaction and perception of a positive outcome of services. Discriminant function analysis was selected to address this question in order to control for the multiple relationships that the demographic variables have with each other and with the domain scores. A variety of the demographic and service variables available were used in the analysis including age, gender, race, length of time in services, current service status, out of home placement and medication status. In addition, the other domain scores were included to assess their relationship to the critical domains of satisfaction and outcomes. A complete list of the variables used and statistical findings are included in Appendix E. Cases with missing values on any of the variables were excluded from the analysis.

# What predicts caregiver's positive perceptions of the outcome of services?

One model including four variables was demonstrated to be highly predictive of caregiver perceptions of positive outcomes for their children and adolescents (N = 839). The model was able to correctly classify 74% of the cases and was especially good at predicting reports of positive outcome. Of those caregivers who reported positive perceptions of outcome, 92% were correctly classified using the model. The variables included in the model are as follows:

- Satisfaction
- Family participation in treatment
- Youth living at home over the last six months
- Medication

Caregivers with positive perceptions of outcome generally report high levels of satisfaction and participation in their child's treatment. They feel that they got the services they needed and were included in setting goals for treatment. In addition, their perceptions were related to other indicators of positive functioning, including the youth living at home for the last six months and *not* on medication for emotional or behavioral difficulties.

#### Positive outcomes predicted by:

- Caregiver satisfaction with services
- Caregiver participation in treatment
- Youth in the home for last six months
- Youth not on medication

# What predicts caregiver's satisfaction with services?

Caregiver satisfaction was by far the most salient predictor of outcome ratings, so a separate analysis was conducted to identify predictors of satisfaction (N = 847). Five variables significantly predicted caregiver ratings of satisfaction with services. The model correctly classified 82% of the cases and included the following variables listed in the order of their contribution to the model:

- Family participation in treatment
- Access
- Cultural Sensitivity of staff
- Current service status
- Length of time in treatment

Several domains of services contribute to caregiver reports of satisfaction with services. Again, caregiver perceptions that they were included in decisions about their child's treatment, had good access to

# Caregivers more satisfied with services when they:

- Participate in services
- Have good access
- See staff as culturally sensitive
- Are still receiving services
- Have been in service a yea ror less

services, and were treated in a culturally sensitive manner by staff predicted satisfaction with those services. If the youth was still receiving services at the time of the survey and had been in services for one year or less, caregivers were more likely to report satisfaction with those services.

#### **CSB Level Caregiver Perceptions of Services**

In the following section, individual CSB ratings for the five indicator domains are presented with the statewide average for the domain included as a reference. These results are provided to assist CSBs in identifying possible areas of improvement. Due to the differences in demographic and treatment characteristics between CSBs and small sample sizes for many of the CSBs, it is important to avoid comparing CSBs on the basis of the following figures. The best use of this information is to track individual CSB progress over time.

The first figure (Fig. 15) illustrates how much CSBs vary on one important variable that has been demonstrated to have a significant influence on caregiver perceptions in all the domains, the percentage of youth still receiving services at the time of the survey. CSBs with a higher percent of youth currently in services are more likely to have caregivers report positive perceptions of services on all domains. This variability should be taken into consideration when reviewing the CSB results on the subsequent figures.

Figure 15: Percent of Youth in Services at Time of Survey by CSB

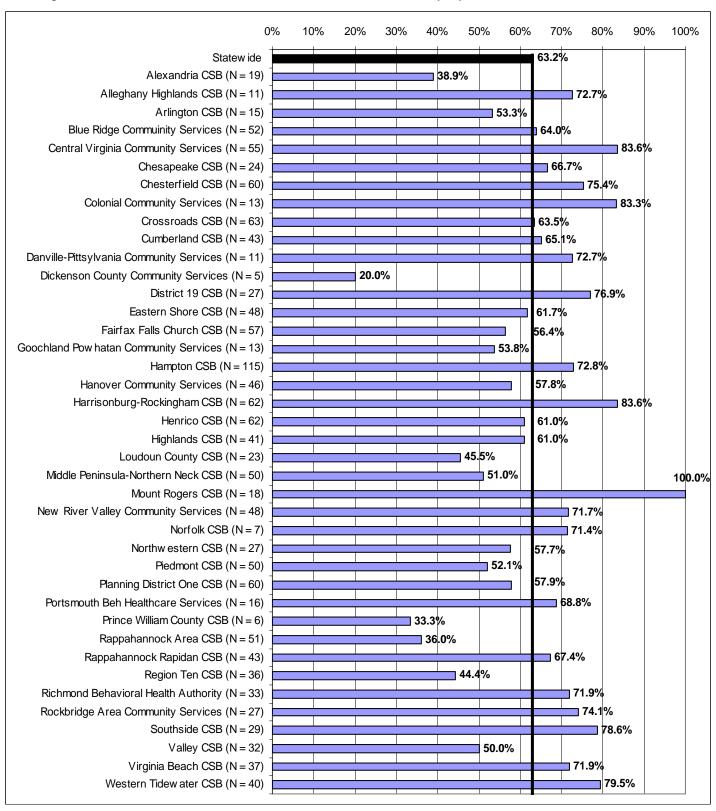


Figure 16: Caregiver Perception of Services by CSB - Satisfaction Domain

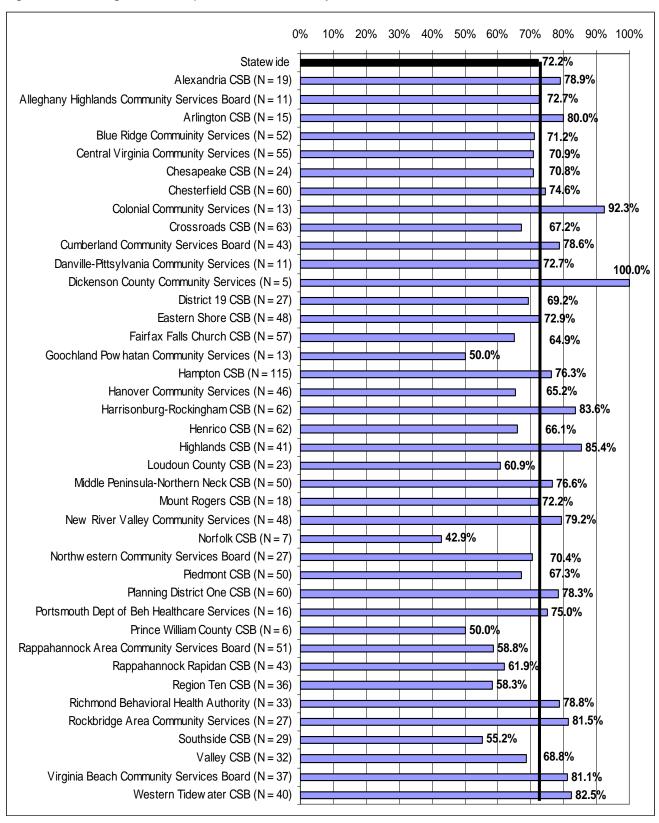


Figure 17: Caregiver Perception of Services by CSB - Access Domain

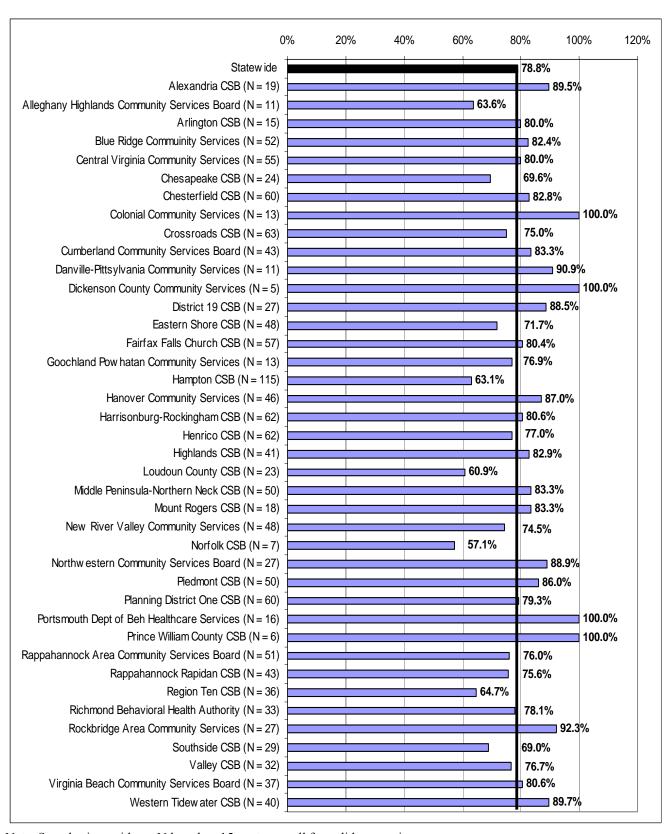


Figure 18: Caregiver Perceptions of Services by CSB – Caregiver Participation Domain

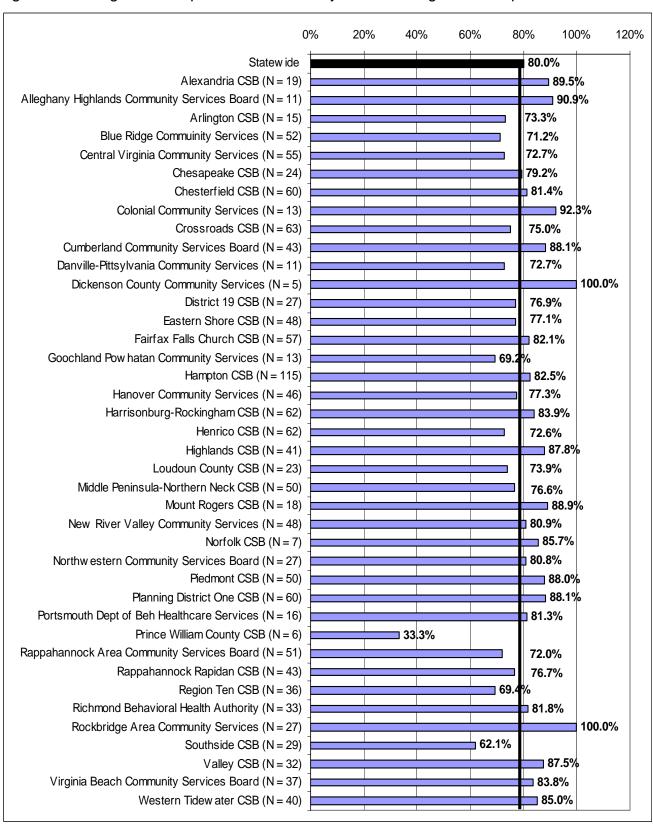


Figure 19: Caregiver Perception of Services by CSB - Cultural Sensitivity Domain

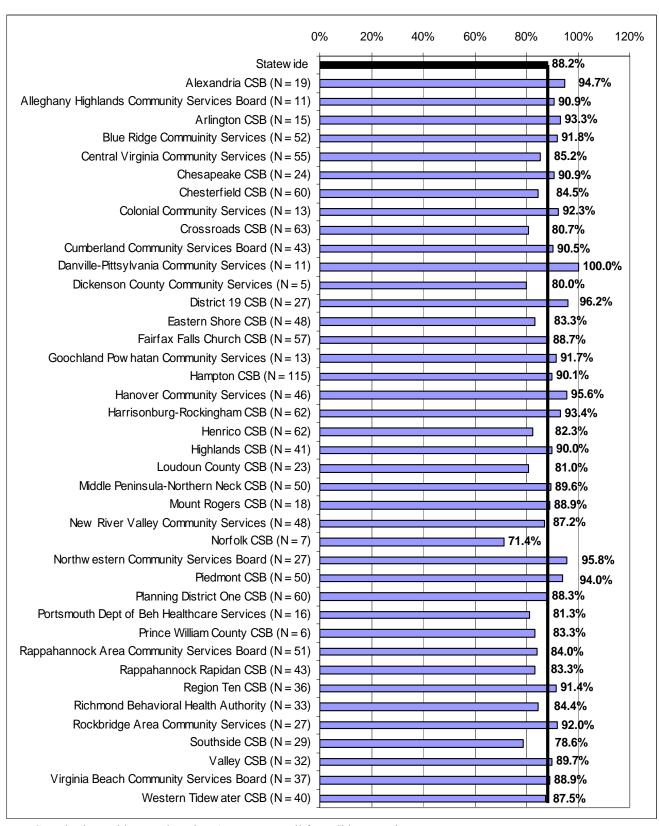
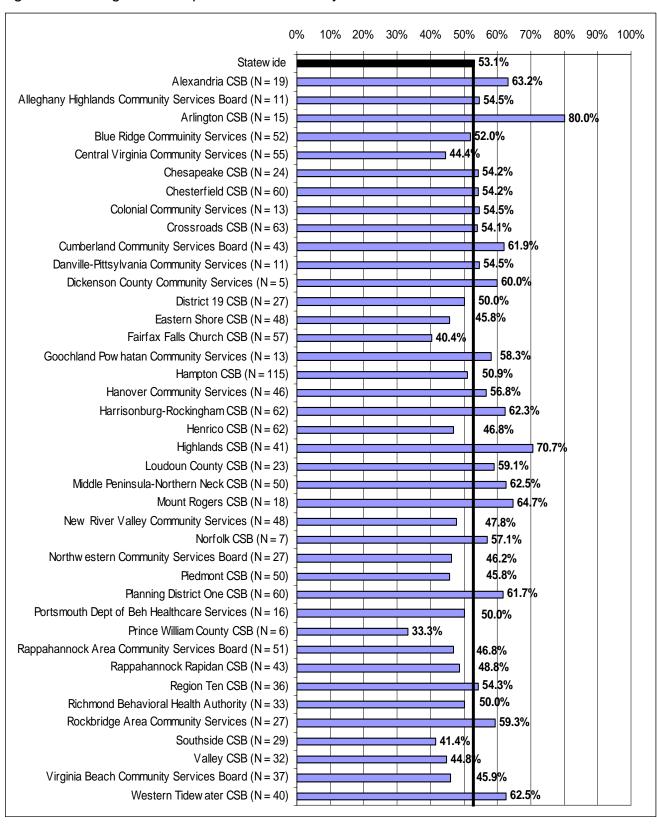


Figure 20: Caregiver Perceptions of Services by CSB - Outcome Domain



#### **CONCLUSION**

In summary, caregivers of youth receiving CSB outpatient mental health services have positive perceptions of those services and these perceptions are more positive than the national average. Highest ratings are seen in the area of caregiver participation in treatment and cultural sensitivity of staff with 88% of caregivers reporting positive perceptions of services in these areas. Caregiver perceptions of access to services and satisfaction with services was also high, 78% and 72% reporting positive perceptions, respectively. Finally, while the lowest ratings were observed for caregiver perceptions of outcome, comparison with previous survey administrations indicates that there has been a significant improvement over time in caregiver perceptions of the effectiveness of services. In 2004, 53% of caregivers report that their child has improved as a result of services compared to only 48% in the 2000 survey.

Several service variables had a significant impact on caregiver perceptions of services and suggest that the population of youth served by CSBs have better outcomes when they have been in services for at least a year and are still receiving services. Lowest levels of satisfaction were found on the item, "My family got as much help as we needed for my child" indicating that 36% of families experienced barriers to getting sufficient amounts of service. These findings suggest that more positive outcomes can be achieved when policies support youth with serious emotional and behavioral difficulties being able to receive effective services for at least a year.

Other variables that had an impact on caregiver perceptions of services included age of the youth and whether the youth had been placed out of the home in the last six months. Caregivers of children under 13 years old reported more participation in treatment, higher satisfaction and more positive outcomes than did caregivers of older children. Also, if the youth had been in a living situation outside the home in the last six months, caregivers reported less postive perceptions of services in all domains than caregivers of youth who remained at home.

Understanding which factors contribute the most to positive outcome can help programs target those factors to improve the effectiveness of services, therefore, analyses were conducted to identify predictors of outcome. Results demonstrated that four factors are predictive of reports of positive perceptions in the outcome domain. When youth have been able to remain in the home for the last six months and not require medication and when caregivers participate in services and feel satisfied with the type and amount of services, caregivers report more positive perceptions in the outcome domain. Since caregiver satisfaction with services was the primary predictor of postive perceptions of outcome, additional analyses were conducted to determine which factors predict satisfaction. This analysis also identified caregiver participation in treatment as a significant predictor of satisfaction. Other variables contributing to the predictive model were: 1) good access to services, 2) cultural sensitivity of staff, 3) currently receiving services, and 4) being in services one year or less. Clearly, when caregivers feel that they have a choice about which services their child receives and the treatment goals they are going to be more satisfied and percieve better outcomes. Those perceptions of positive outcomes are predicated on reports that the child has been able to remain at home in the last six months and not require medication.

These findings were obtained through a mail distribution of surveys to a randomly selected set of caregivers of children who received outpatient mental health services in the FY 2004. Completed surveys were obtained from all 40 CSBs and comparison of the sample to the overall population of youth with SED indicated that the sample had similar demographic features to the larger population.

The majority of the final sample of 1,475 youth were described as being male (55%), White (62%) adolescents (58%) on medication for emotional/behavioral difficulties (65%). They tended to have Medicaid insurance (64%) and to have been in services for more than one year (56%).

The methodology used for this report has several strengths and limitations. First, the use of random selection and the distribution of the surveys by mail ensures that every caregiver of a child receiving services had an equal chance of being selected for the survey and that the results included perceptions of services from those who may no longer be receiving services. This methodology increases the probability that caregivers who are dissatisfied with services will have the opportunity to respond. Therefore, the results are likely to reflect the perceptions of the overall population receiving services.

Second, there were no differences between the survey sample and the larger population on key sociodemographic variables available for comparison. Therefore, to the degree that there are no significant differences between those returning surveys and those who do not, these results can be interpreted to represent all caregivers of youth receiving outpatient services from CSBs.

One major limitation of this report is the cross-sectional nature of the survey. These findings represent the perceptions of caregivers at a single point in time and perceptions are subject to change over time. Without measures of baseline functioning for comparison, the survey measures of youth functioning can only be interpreted as a snapshot of how the youth are doing currently. Therefore, these indicators should not be viewed as a measure of the effectiveness of the survices provided and, instead, should only be used to provide a picture of the system performance over time.

An additional limitation should be taken into consideration, especially when reviewing results for individual CSBs. There was wide variability in response rates by CSB, ranging from 4.3% to 40.7%. The average response rate for this type of survey is around 20%, therefore, the ability to generalize results for those CSBs with a much lower response rates is limited. While sample sizes for each individual CSB are not sufficient to have confidence that the results are truly representative to the total population of youth receiving services at that CSB, the individual CSB results are provided to provide a rough estimate about how services at each CSB are perceived. Due to the small sample sizes, CSBs should not be compared to each other on the basis of these findings.

Despite these limitations, the results of this survey provide valid and useful information about the outpatient services provided to children and adolescents through Virginia's public mental health system. Overall, caregivers perceive those services very positively and there has been a gradual increase over time in the percentage of youth who are perceived as doing better as a result of the services they received. In addition, the results have implications for what might be considered "best practices". It is likely that outcomes will be better when caregivers are involved in chosing treatment services and goals and when sufficient services are provided to meet the child's needs.

# **APPENDIX A**

# **Youth Services Survey for Families**

#### YOUTH SERVICES SURVEY FOR FAMILIES (YSS-F)

Please help our agency make services better by answering some questions about the services your child received **OVER THE LAST 6 MONTHS.** Your answers are confidential and will not influence the services you or your child receive. Please indicate if you **Strongly Disagree, Disagree, Are Undecided, Agree, or Strongly Agree** with each of the statements below. Put a cross (**X**) in the box that best describes your answer. Thank you!!!

		Strongly Disagree	Disagree	Undecided	Agree	Strongly Agree
		(1)	(2)	(3)	(4)	(5)
1.	Overall, I am satisfied with the services my child received.		, , , , , , , , , , , , , , , , , , ,	(-)	( )	
2.	I helped to choose my child's services.					
3.	I helped to choose my child's treatment goals.					
4.	The people helping my child stuck with us no matter what.					
5.	I felt my child had someone to talk to when he/she was troubled.					
6.	I participated in my child's treatment.					
7.	The services my child and/or family received were right for us.					
8.	The location of services was convenient for us.					
9.	Services were available at times that were convenient for us.					
10.	My family got the help we wanted for my child.					-
11.	My family got as much help as we needed for my child.					-
12.	I was able to get an appointment as soon as I wanted					
13.	Staff treated me with respect.					
14.	Staff respected my family's religious/spiritual beliefs.					
15.	Staff spoke with me in a way that I understood.					
16.	Staff were sensitive to my cultural/ethnic background.					
As	a result of the services my child and/or family received:					
17.	My child is better at handling daily life.					
18.	My child gets along better with family members.					
19.	My child gets along better with friends and other people.					
20.	My child is doing better in school and/or work.					1
21.	My child is better able to cope when things go wrong.					1

Molly Brunk, 1999. This instrument was developed as part of the State Indictor Project funded by the Center for Mental Heath Services (CMHS). It was adapted from the Family Satisfaction Questionnaire used with the CMHS Comprehensive Community Mental Services for Children and their Families Program and the MHSIP Consumer Survey.

Version 6/5/01

22. I am satisfied with our family life right now.

	nswer the fo	ollowing ques	stions to let us kı	now how	your child i	s doing.			
Is	s your child	still getting s	ervices from this	Center?			∐Yes		□No
		arrently receiv	eceive services fr ving services, hov 1 - 2 months	w long ha	ve you been			☐ Mo	re than 1 year
Is	s your child	currently livi	ng with you?				□Yes		□No
Н	Has your chi	ld lived in an	y of the following	g places in	n the last 6 ı	nonths? (	CHECK AL	L THAT	APPLY)
	b. Wit c. Fos d. The c. Cris	h one or both h another fam ter home rapeutic foste sis shelter neless shelter	r home	☐ g. ☐ h. ☐ i. ☐ j. ☐ k. ☐ l. ☐ m.	Group hom Residential Hospital Local jail of State correc Runaway/h Other (desc	treatment or detention ctional faci	n facility ility n the streets		
Iı	n the last y	ear, did your	child see a medic	al doctor			emergency No		Check one) not remember
			child see a medic al exam or becaus		was sick? (C		other than a h □No		mergency not remember
Is	s your child	on medicatio	n for emotional/b	ehavioral	l problems?				□Yes
2	29a. If y	es, did the do	ctor or nurse tell	you and/o	or your child	what side	effects to wa	tch for?	∐Yes
Н	Has your chi	ld been arrest	ed by the police i	n the last	month?				□Yes
		as your child less	child go to court absent from scho 2 days Not applicab	ool during	the last mon 5 days	nth?	ays 🗌 Mo	re than 10	□Yes 0 days
V L	What is your  ☐ Parent	relationship	to the child? or family member	Fost	er parent	] Case Mar	nager (DSS)	☐ Oth	er:
V	What type of Medicaid		es your child hav		er Insurance		No Insurance	e	
V	What has be	en the most he	elpful thing about	the servi	ices you and	your child	received ov	er the las	t 6 months?

Thank you for taking the time to answer these questions!

# APPENDIX B

# **Child Mental Health Priority Classification Form**

Virginia Department of Mental Health, Mental Retardation and Substance Abuse Services

# CHILD/ADOLESCENT MENTAL HEALTH AND SUBSTANCE ABUSE PRIORITY POPULATION CLASSIFICATION FORM

The purpose of this form is to determine whether an individual, **age 17 years or younger**, meets the criteria for inclusion in the child and adolescent mental health and substance abuse priority populations. Please follow each step as directed.

DEMOGRAPHIC INFORMATION
Consumer Name: CSB Name: Date of Assessment: Date of Birth: Current Status: □ In service □ New Admission □ Annual Assessment □ Re-Admission
STEP 1. EVALUATE FOR CHILD MENTAL HEALTH PRIORITY POPULATION
CRITERION A: Diagnostic Criteria
A person who meets DSM IV diagnostic criteria for any of the following disorders and who is presenting for related treatment should be considered a part of this priority population. Please note that for Major Depression, the disorder must be specified as "severe".
Please check the diagnostic category that applies to this consumer (if any).
Psychotic Disorders
Schizophrenia, all types (295.10, 295.20, 295.30, 295.60, 295.90)Schizophreniform Disorder (295.40)Schizoaffective Disorder (295.70)Psychotic Disorder, NOS (298.9x)
Depression and Bipolar Disorders
Bipolar I Disorder (296.40, 296.4x, 296.6x, 296.5x, 296.7)Bipolar II Disorder (296.89)Bipolar Disorder, NOS (296.8)Major Depressive Disorder, Severe (296.23, 296.24, 296.33, 296.34)
Does youth meet criteria for one of the disorders listed above?
A. Yes. Check "Meets criteria for Child Mental Health Priority Population" in Mental Health Assessment Summary on page 3.
B. No. Continue to evaluation of functional criteria on next page.

CRITERION B: Functional Impairment
If the consumer has a diagnosis other than one listed on page 1 please document the consumer's DSM IV diagnosis below (include V codes if applicable). If consumer has an Axis II diagnosis of mental retardation, complete the Mental Retardation Classification Form. Note. A diagnosis is not necessary for inclusion in the priority population.
Axis I diagnosis: (primary) (secondary) (tertiary) Axis II diagnosis: (primary) (secondary)
Written documentation in the youth's record must support that the functional criteria below are met as a direct result or manifestation of the youth's emotional or behavioral problems.
CHECK ALL FUNCTIONAL CRITERIA THAT APPLY
I. Problems <u>in the last 12 months</u> that are significantly disabling based upon the social functioning of most children their age. Youth has:
attempted suicide one or more times, or has had a specific plan for committing suicide one or more times (a current or past history of suicidal ideation alone is not be sufficient to meet this criterion).
been hospitalized in a public or private psychiatric facility.
been enrolled in a special education program for the emotionally handicapped (with an IEP), or is scheduled for an IEP to determine placement in a special education program for the emotionally handicapped.
routinely missed two or more days of school or work per month as a direct result of the symptoms associated with their mental illness (i.e., do not include absence due to physical illness).
a drop in school performance/productivity to point that there is a risk of failing at least half of courses.
exhibited behavior that was so disruptive/aggressive that youth presents threat to the safety of others in the home or in the community.
persistent problems/difficulties relating to peers that result in few, if any, positive peer relationships.
at least one family relationship characterized by constant conflict that is disruptive to family environment.
required intervention by at least one agency that is not the CSB.
II. Problems in personality development and social functioning exhibited over at least one year's time
problems have lasted at least one year.
problems are expected to last at least one year without services.
Does child meet at least <u>two</u> criteria in Section I AND <u>one</u> criterion in Section II above?
A. Yes. Check "Meets Criteria for Child Mental Health Priority Population" in Mental Health Assessment Summary
B No Continue to Step 2 and complete evaluation for the At – Risk Priority Population

# **APPENDIX C**

Table 2. Response Rate by CSB

	Number	Completed	Response
	Sampled	Surveys	Rate
Alexandria CSB	107	19	17.8%
Allegheny Highlands Community Services Board	46	11	23.9%
Arlington CSB	116	15	12.9%
Blue Ridge Community Services	199	52	26.1%
Central Virginia Community Services	166	55	33.1%
Chesapeake CSB	81	24	29.6%
Chesterfield CSB	200	60	30.0%
Colonial Community Services	51	13	25.5%
Crossroads CSB	197	63	32.0%
Cumberland Community Services Board	200	43	21.5%
Danville-Pittsylvania Community Services	27	11	40.7%
Dickenson County Community Services	43	5	11.6%
District 19 CSB	136	27	19.9%
Eastern Shore CSB	192	48	25.0%
Fairfax Falls Church CSB	250	57	22.8%
Goochland Powhatan Community Services	49	13	26.5%
Hampton CSB	350	115	32.9%
Hanover Community Services	171	46	26.9%
Harrisonburg-Rockingham CSB	199	62	31.2%
Henrico CSB	250	62	24.8%
Highlands CSB	167	41	24.6%
Loudoun County CSB	98	23	23.5%
Middle Peninsula-Northern Neck CSB	250	50	20.0%
Mount Rogers CSB	52	18	34.6%
New River Valley Community Services	200	48	24.0%
Norfolk CSB	43	7	16.3%
Northwestern Community Services Board	232	27	11.6%
Piedmont CSB	225	50	22.2%
Planning District One CSB	300	60	20.0%
Portsmouth Dept of Behavioral Healthcare Services	110	16	14.5%
Prince William County CSB	141	6	4.3%
Rappahannock Area Community Services Board	200	51	25.5%
Rappahannock Rapidan CSB	183	43	23.5%
Region Ten CSB	200	36	18.0%
Richmond Behavioral Health Authority	244	33	13.5%
Rockbridge Area Community Services	92	27	29.3%
Southside CSB	80	29	36.3%
Valley CSB	126	32	25.4%
Virginia Beach Community Services Board	123	37	30.1%
Western Tidewater CSB	112	40	35.7%
Statewide Total		1475	23.8%

#### **APPENDIX D**

Table 3. Descriptive Statistics for Responses to YSS\_F Items

	Mean <sup>a</sup>	Standard Deviation	N	% Agree <sup>b</sup>	% Disagree <sup>b</sup>
1. Overall, I am satisfied with the services my child received.	4.0	1.0	1,457	81.4%	10.8%
2. I helped to choose my child's services.	3.9	1.0	1,446	80.0%	13.4%
3. I helped to choose my child's treatment goals.	3.9	1.0	1,445	78.7%	12.9%
4. The people helping us stuck with us	4.0	1.1	1,450	78.0%	11.1%
5. I felt my child had someone to talk to	3.9	1.1	1,437	76.3%	12.0%
6. I participated in child's treatment	4.2	0.9	1,456	88.7%	6.3%
7. The services were right for us.	3.9	1.0	1,451	74.0%	10.8%
8. The location was convenient for us.	4.1	0.9	1,453	87.2%	8.5%
9. Services available at convenient times.	4.0	1.0	1,451	83.6%	9.7%
10. My family got the help we wanted	3.8	1.1	1,458	71.9%	15.1%
11. My family got as much help as we needed	3.6	1.2	1,449	64.2%	18.8%
12. I was able to get appointment as soon as I wanted	3.8	1.1	1,455	74.1%	15.7%
13. Staff treated me with respect.	4.3	0.8	1,461	92.3%	4.2%
14. Staff respected my family's religious/spiritual beliefs.	4.2	0.8	1,419	85.3%	2.2%
15. Staff spoke in a way that I understood.	4.3	0.7	1,456	94.7%	2.7%
16. Staff were sensitive to my cultural/ethnic background.	4.1	0.8	1,402	85.5%	2.9%
17. My child is better at handling daily life.	3.5	1.1	1,441	59.6%	19.0%
18. My child gets along better with family members.	3.5	1.1	1,435	60.2%	20.1%
19. My child gets along better with others	3.5	1.1	1,431	62.1%	17.7%
20. My child is doing better in school and/or work.	3.6	1.1	1,427	61.0%	18.9%
21. My child is better able to cope when things go wrong.	3.3	1.1	1,432	50.9%	25.3%
22. I am satisfied with our family life right now.	3.4	1.1	1,434	55.2%	23.2%

<sup>&</sup>lt;sup>a</sup>Scale ranges from 1 "Strongly Disagree" to 5 "Strongly Agree." Higher mean scores correspond with greater satisfaction.

<sup>&</sup>lt;sup>b</sup>Percentages in the agree column include those who responded "agree" or "strongly agree" to the statement. Percentages in the disagree column include those who responded "disagree" or "strongly disagree". Percentages for caregivers who responded "undecided" are not shown, but can be calculated by substracting the total of the % agree and the % disagree from 100%.

# **APPENDIX E**

Table 4. Demographic Information Statewide and by HPR

	Н	PR I	F	IPR II	Н	PR III	HF	PR IV	HPF	R V	STATE CHILD MH SAMPLE
TOTAL CASES		278		120		394	(	333	35	0	1475
								•			
		Gender									
Male		3.2%		8.3%		5.1%		3.2%	60.3		54.8%
Female	5	51.8% 41.7%		4	4.9%	46	5.8%	39.7	7%	45.2%	
	Race										
White		9.1%		28.8%	8	32.4%	53	3.9%	44.3	3%	62.3%
African American		5.5%		6.3%	1	4.2%		2.2%	52.0		30.2%
Asian/Pacific Islander		0%		1.0%		0%		.9%	0%		0.3%
American	0	.4%	3	39.4%	(	0.5%	0	.6%	0%	6	3.2%
Indian/Alaskan Native		00/	1	4 40/		0.007	0	40/	0.7	07	4.00/
Other	4	.0%	I	4.4%		2.8%	2	.4%	3.7	%	4.0%
<u> </u>											Γ
112	,	20/	_	.0.00/		1.00/	2	40/	4 5	07	F (0)
Hispanic	3	.3%	b	52.2%		1.8%	3	5.4%	4.5	%	5.6%
<u> </u>								1			ı
Average Age	1:	2.7%	1	14.1% 12.9%		13	3.7%	13.5	5%	13.3%	
								•			
					Re	esidenc	e in	Last S	ix Mo	nths	a
Private residence		69.19		67.5%	ò	69.0%	6	56.4%	62.		66.7%
Foster home		6.8%		3.3%		5.8%		3.0%	2.3		4.3%
Therapeutic Foster home	<del>,</del>	2.2%		0.8%		4.6%		1.5%	2.6		2.6%
Shelter		0.8%				0.3%		0.3%	1.1		0.6%
Group home		1.1%				3.0%		1.5%	3.7		2.4%
Residential Treatment		5.8%				3.3%		5.4%	4.6		4.5%
Hospital		2.9%	.9% 3.3%			2.3%		3.3%	1.7	%	2.6%
Local Jail/Correctional Facility		3.6%		6.7%		2.5%		4.2%	2.9		3.5%
State Corrections Setting		0.7%		0.8%		0.3%		0.9%	0.9		0.7%
On run/homeless/on stre	et	0.0%		0.0%		1.0%		0.3%	0.9		0.5%
Other		8.3%		5.0%		6.3%		6.9%	7.4		7.0%

<sup>&</sup>lt;sup>a</sup>All settings in which a youth resides during the six month period are included. Some youth lived in multiple settings.

Currently Living with Caregiver	85.0%	91.2%	85.7%	89.8%	89.4%	87.8%
			Ins	urance Ty	pe	
Medicaid	60.7%	49.6%	76.1%	58.9%	62.6%	63.8%
FAMIS	7.0%	5.3%	8.5%	8.5%	6.7%	7.5%
Other insurance	27.6%	35.4%	13.2%	27.9%	27.4%	24.5%
No insurance	4.7%	9.7%	2.3%	4.7%	3.3%	4.2%
			Length o	of Time in	Service	
Less than 1 month	3.0%	7.1%	3.7%	4.4%	2.4%	3.7%
1 – 2 months	5.5%	3.7%	4.2%	5.0%	8.9%	5.6%
3 – 5 months	12.5%	19.5%	7.9%	9.7%	8.6%	10.3%
6 months – 1 year	26.9%	29.2%	32.3%	19.4%	18.1%	24.8%
More than 1 year	52.0%	41.6%	51.9%	61.4%	62.0%	55.6%
	<u> </u>					
Currently in Services	60.0%	50.0%	66.8%	64.7%	68.5%	64.1%
	T					
			Me	dical Issu	es	
On psychotropic meds	60.7%	54.6%	65.6%	68.6%	69.8%	65.4%
Informed of side effects	77.5%	68.7%	80.4%	81.9%	81.0%	79.5%
	Performance Indicator Results					
Good access to services	78.5%	79.0%	81.2%	79.4%	75.5%	78.8%
Participation in treatment	80.4%	78.2%	82.6%	75.5%	81.5%	80.0%
planning						
Cultural sensitivity of staff	89.5%	88.6%	89.7%	85.6%	88.0%	88.2%
General satisfaction	69.2%	67.5%	75.5%	67.7%	76.6%	72.2%
Positive outcome	52.6%	52.1%	55.1%	51.4%	53.0%	53.1%

#### **APPENDIX F**

#### Discriminant Analysis

Discriminant function analysis was selected to investigate differences between two groups relative to several variables simultaneously. The following variables were recoded as dichotomous measures to support the use of discriminant function analysis (first category scored as a 0 and second scored as a 1).

Gender (female, male)

Race categories (Non-white, White)

Hispanic status (no, yes)

Age group (under 13 years, 13 - 22 years old)

Length of time in services (> 1 year, 0 - 1 year)

Current service status (no longer in services vs. currently in services)

Type of Insurance (Medicaid, Non-Medicaid)

Medication (no, yes)

In home last six months (no, yes)

Access indicator score (no, yes)

Family Participation indicator score (no, yes)

Cultural Sensitivity indicator score (no, yes)

Satisfaction indicator score (no, yes)

Outcome indicator score (no, yes)

Two separate analyses were conducted. The first examined these variables in relation to caregivers who reported positive outcomes versus those who did not report positive outcomes. The variables included in the predictive model and the strength of their relationship to group membership is shown in Table 4. The negative association of medication indicates that the group with the 0 value, not on medication, is associated with perceptions of positive outcome.

Table 4. Structure Coefficients of Discriminant Variables for Perceptions of Positive Outcome

Discriminant Variables	Structure Coefficients
Satisfaction indicator score	.963
Family participation indicator score	.576
In home last six months	.190
On medication	053

This model with four variables was able to correctly classify 74.3% of cases according to their actual group membership. Of those who actually perceived positive outcomes, the model was able to correctly classified 92.7%. Full results are displayed in Table 5.

**Table 5. Classification Results for Positive Outcome** 

Actual Group	_	Predicted Group Membership		
Membership	N	No	Yes	
No	507	275	232	
		54.2%	45.8%	
Yes	569	44	525	
		7.73%	92.7%	
Ungrouped	13	1	12	
		7.69%	92.3%	

Given that satisfaction was such a strong predictor of perceptions of positive outcomes, the second analysis compared caregivers who reported satisfaction with services versus those who did not. The outcome indicator score was not included in the analysis so other influences could be investigated. This resulting model included the variables in Table 6.

Table 6. Structure Coefficients of Discriminant Variables for Perceptions of Satisfaction

Discriminant Variables	Structure Coefficients
Family participation indicator score	.806
Access indicator score	.536
Cultural Sensitivity indicator score	.506
Current service status	.279
Length of time in service	.228

This model with five variables was able to correctly classify 82.1% of cases according to their actual group membership. Full results are displayed in Table 7.

**Table 7. Classification Results for Satisfaction** 

Actual Group		Predicted Group Membership		
Membership	N	No	Yes	
No	361	235	126	
		65.1%	34.9%	
Yes	972	112	860	
		11.5%	88.5%	
Ungrouped	2	0	2	
			100%	